

Principal Investigator: Lei Zhang, PhD, MBA Program Manager:
Jasmine Williams, MPH, LPN, CHES

Epidemiologist: Danielle Brown, MPH

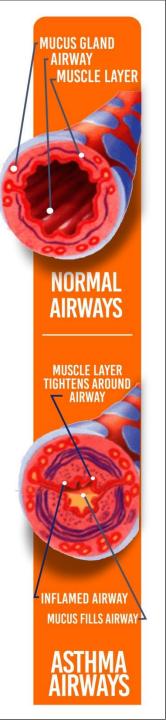
^{*} Program Advisor: Monica Stinson, MS, CHES

Mississippi Asthma Prevalence Data

Danielle Brown, MPH Asthma Program Epidemiologist January 31, 2019

Overview

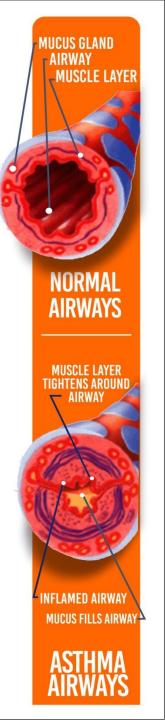
- Updated MS and US childhood and adult asthma statistics
- Year to year trend of MS childhood and adult asthma
- MS asthma medical cost
- Asthma Hospitalization Statistics by MSDH Districts



Asthma Prevalence?

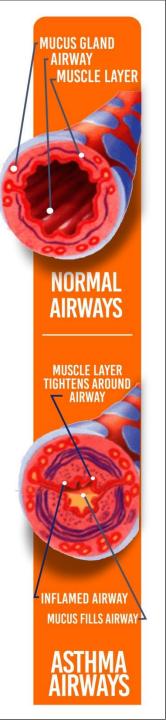
Asthma prevalence is an estimate of the percentage of the U.S./MS population with asthma. These estimates help us to understand the asthma burden in our communities.

- "Lifetime" asthma prevalence is the percentage of the U.S./MS population who have been diagnosed with asthma
- "Current" asthma prevalence is the percentage of the U.S./MS population who had been diagnosed with asthma and still experiencing asthma episodes.

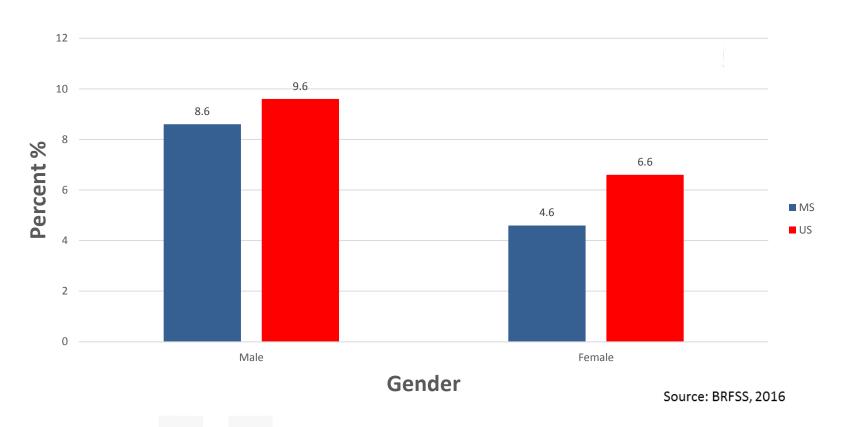


Childhood Asthma

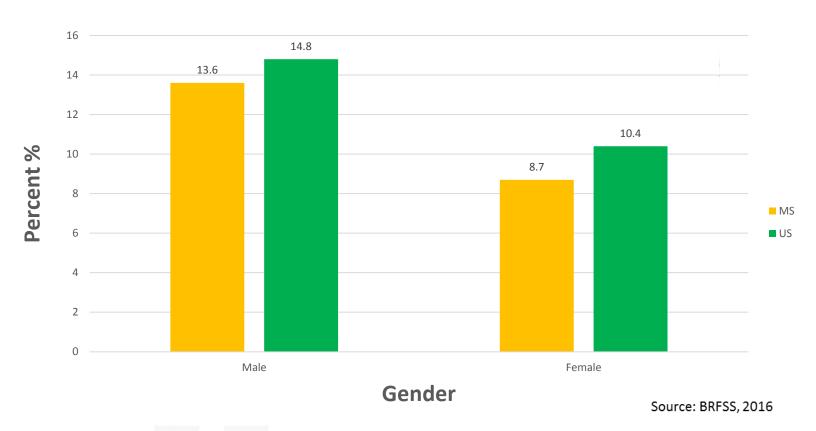
- Childhood asthma (pediatric asthma) is the most common serious chronic disease in infants and children ages 0-17 years, difficult to diagnose and can not be cured.
- Currently affecting an estimated 6.1 million children under 18 years in the United States.
- With 3.5 million suffering from an asthma attack or episode in 2016.
- According to the American Lung Association, the total annual cost of asthma is approximately \$56 billion a year.
- In 2013, children with asthma between the ages of 5 and 17 years-old missed an average of 2.6 school days per child.



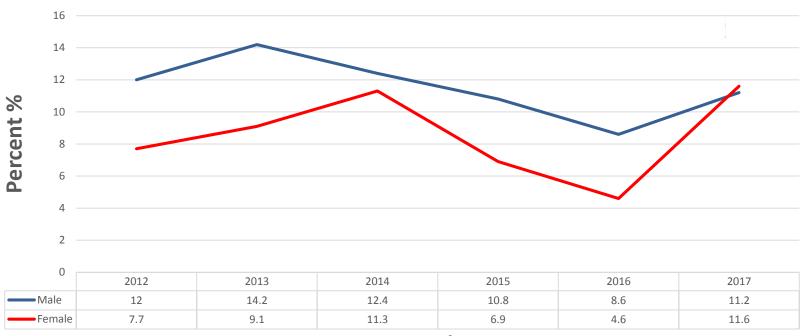
Current Childhood Asthma Prevalence by Gender: Mississippi vs. United States, 2016



Lifetime Childhood Asthma Prevalence by Gender: Mississippi vs. United States, 2016

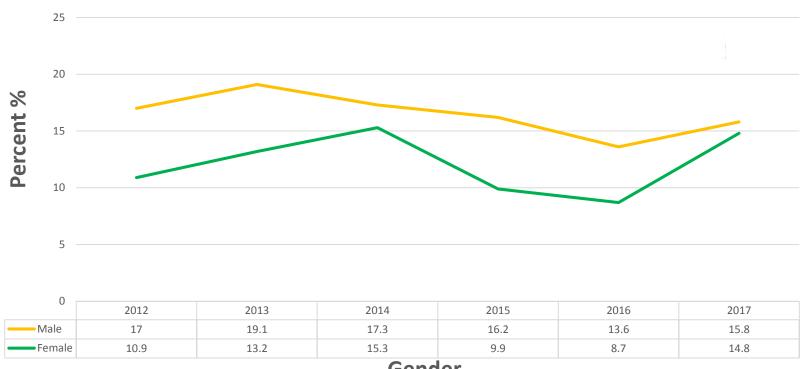


Current Childhood Asthma by Gender, Mississippi: 2012-2017



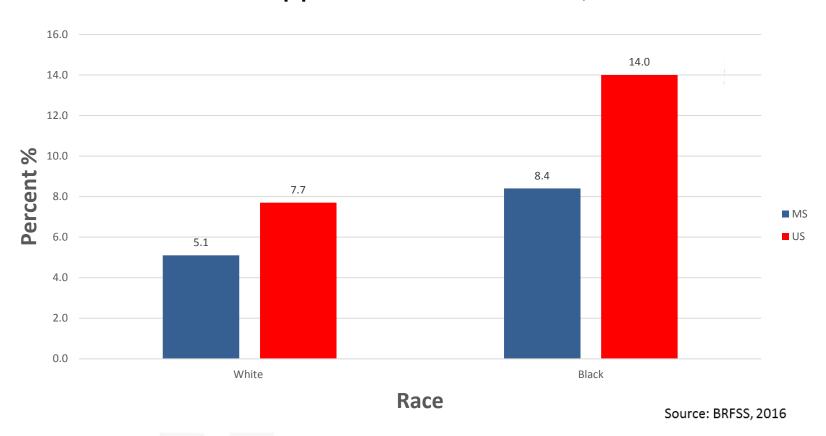
Gender

Lifetime Childhood Asthma by Gender, Mississippi: 2012-2017

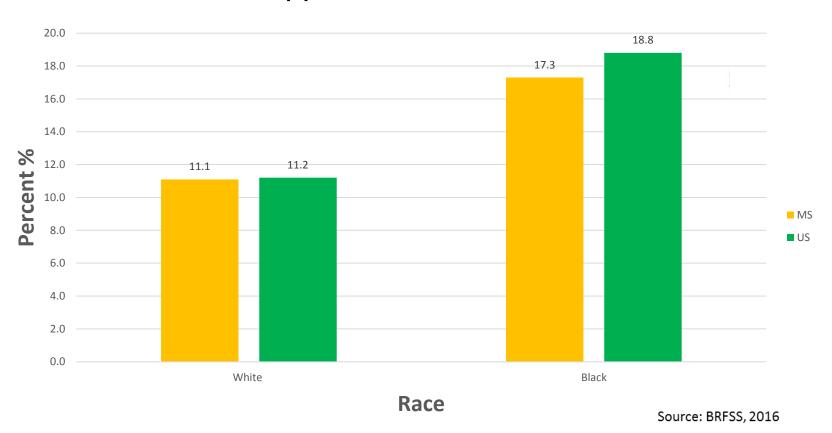


Gender

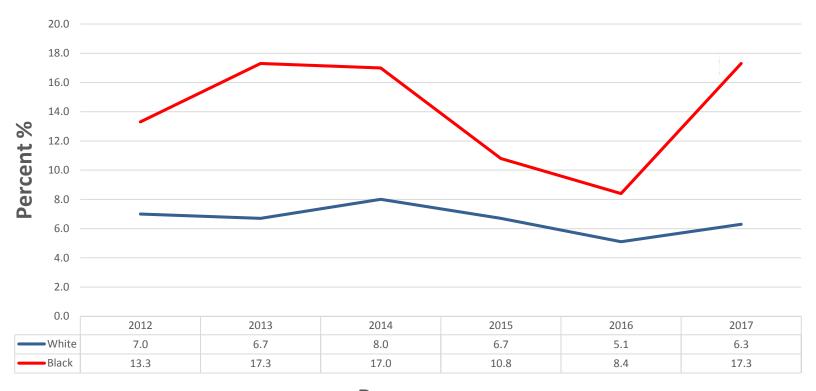
Current Childhood Asthma Prevalence by Race: Mississippi vs. United States, 2016



Lifetime Childhood Asthma Prevalence by Race: Mississippi vs. United States, 2016

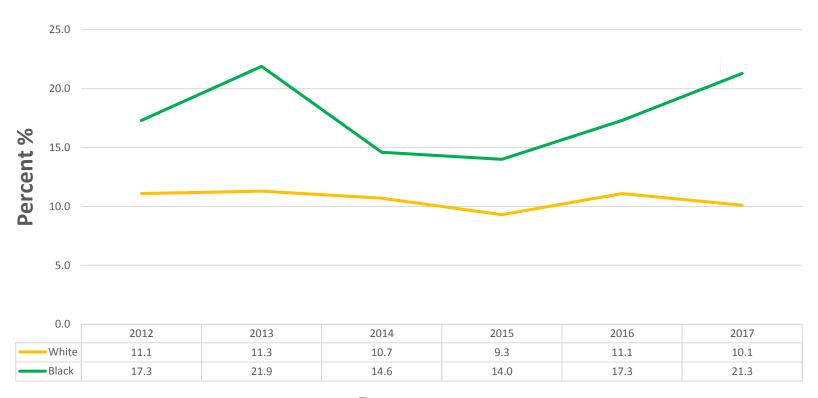


Current Childhood Asthma by Race, Mississippi: 2012-2017



Race Source: BRFSS, 2012-2017

Lifetime Childhood Asthma by Race/Ethnicity, Mississippi: 2012-2017

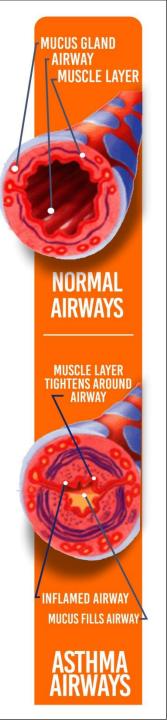


Race

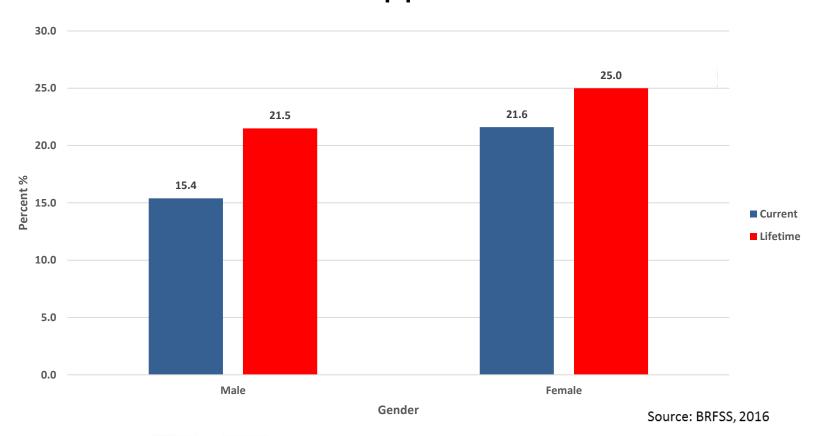
Gender and Racial Asthma Medical Burden among Children

Healthcare

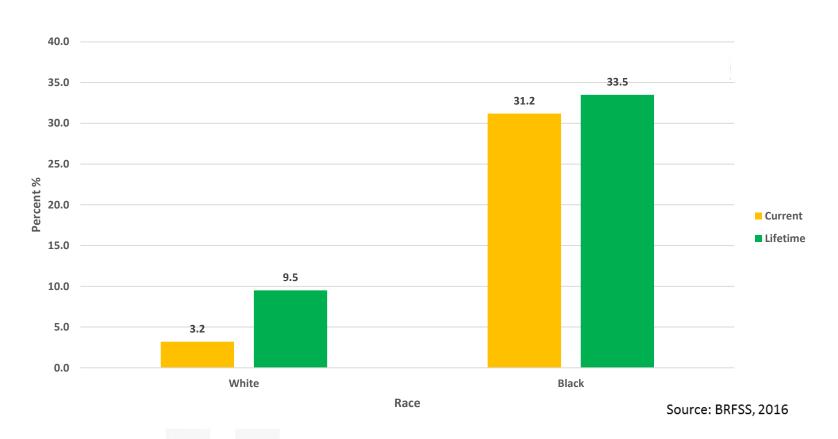
- In MS, more girls than boys with asthma cannot see a doctor because of cost. In 2017, 25.0% of girls with lifetime asthma reportedly could not see a doctor because of cost, compared to 21.5% of male children.
- In MS, more blacks than whites with asthma cannot see a doctor because of cost. In 2017, 33.5% of black children with lifetime asthma reportedly could not see a doctor because of cost, compared to 9.5% of white children.



Proportion of Childhood Asthma Cost, Mississippi: 2017

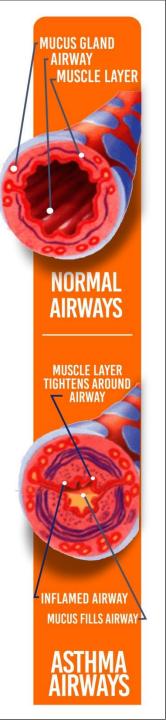


Proportion of Childhood Asthma Cost, Mississippi: 2017

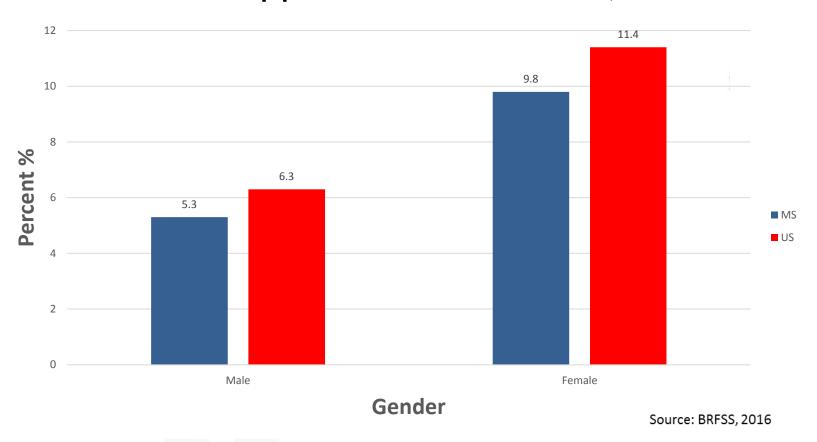


Asthma in Adults

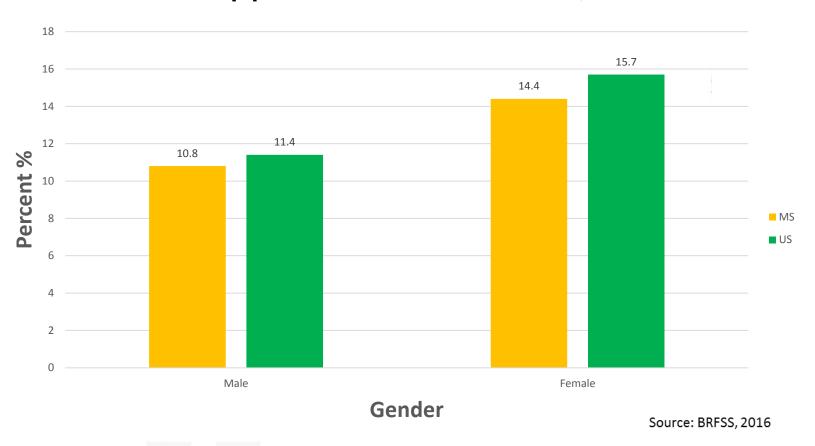
- Asthma is a long-term disease and can be exacerbated by exposure to triggers causing asthma flare-ups
- In 2016, it was estimated that 20.4 million American adults currently had asthma. Of these, 9.7 million Americans had an asthma flare-up
- In 2013, asthma accounted for an estimated 10.1 million lost work days among employed adults.
- The total annual direct healthcare cost of asthma is as high as \$56 billion dollars.



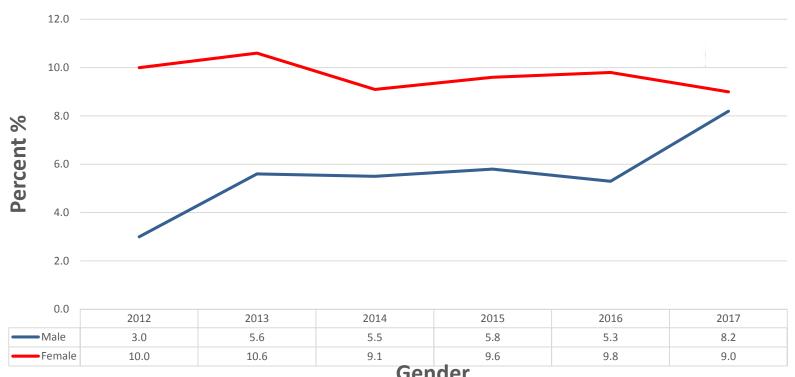
Current Adult Asthma Prevalence by Gender: Mississippi vs. United States, 2016



Lifetime Adult Asthma Prevalence by Gender: Mississippi vs. United States, 2016

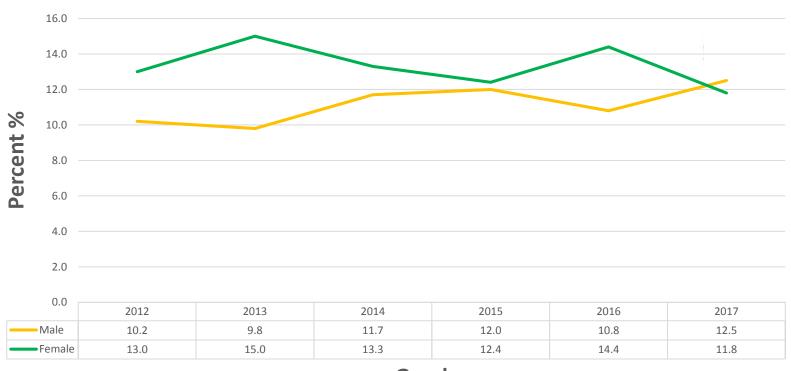


Current Adult Asthma by Gender, Mississippi: 2012-2017



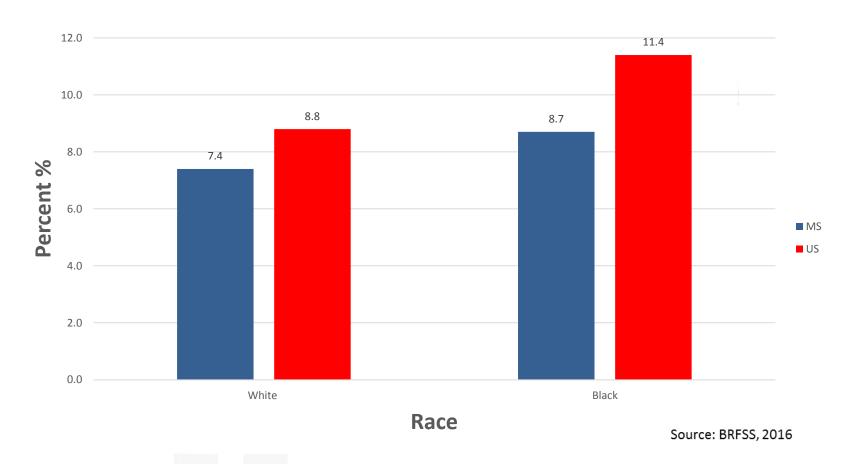
Gender

Lifetime Adult Asthma by Gender, Mississippi: 2012-2017

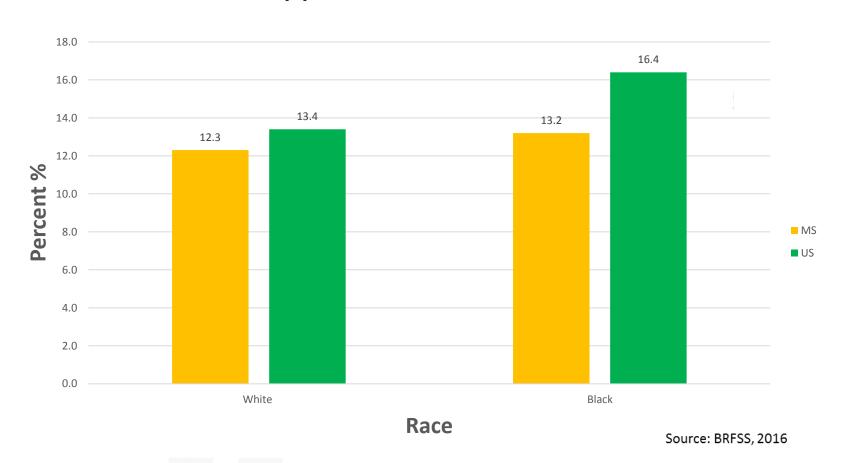


Gender

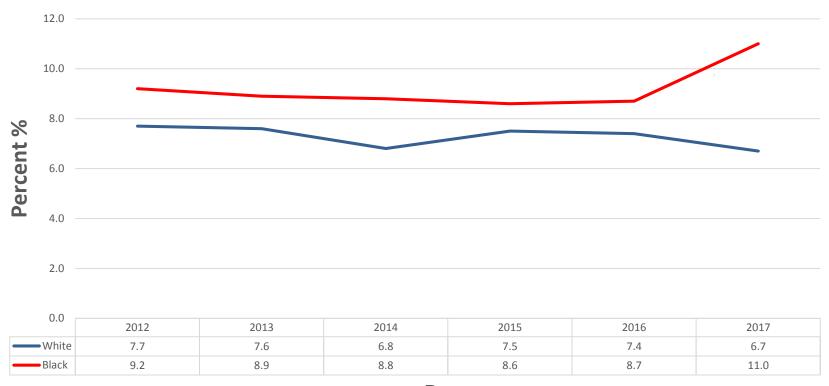
Current Adult Asthma Prevalence by Race: Mississippi vs. United States, 2016



Lifetime Adult Asthma Prevalence by Race: Mississippi vs. United States, 2016

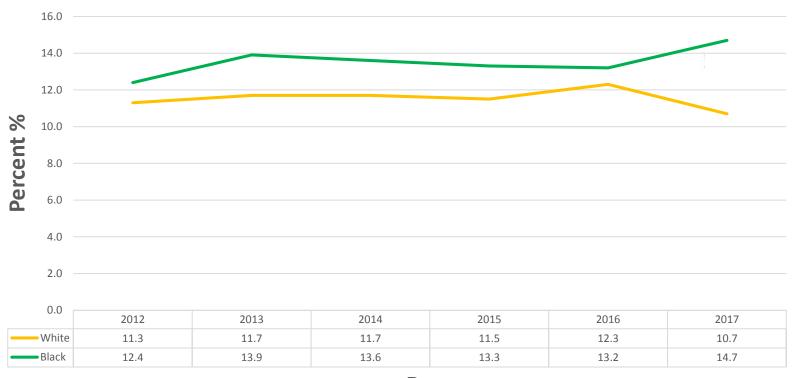


Current Adult Asthma by Race, Mississippi: 2012-2017



Race

Lifetime Adult Asthma by Race, Mississippi: 2012-2017

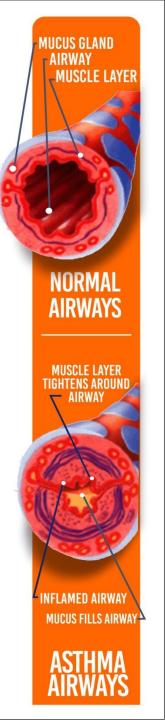


Race

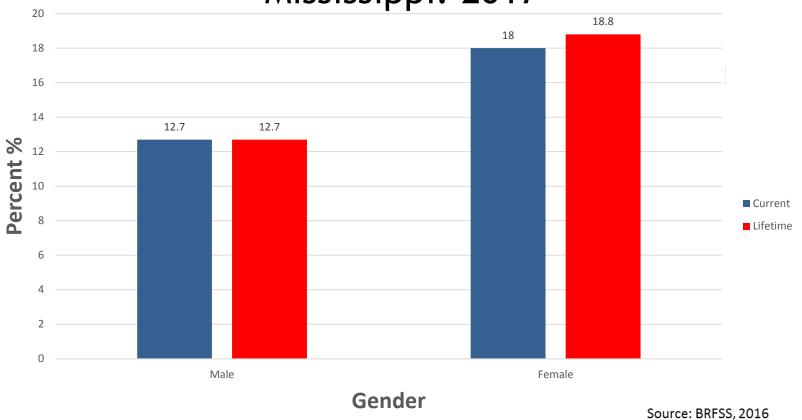
Gender and Racial Asthma Medical Burden among Adults

Healthcare

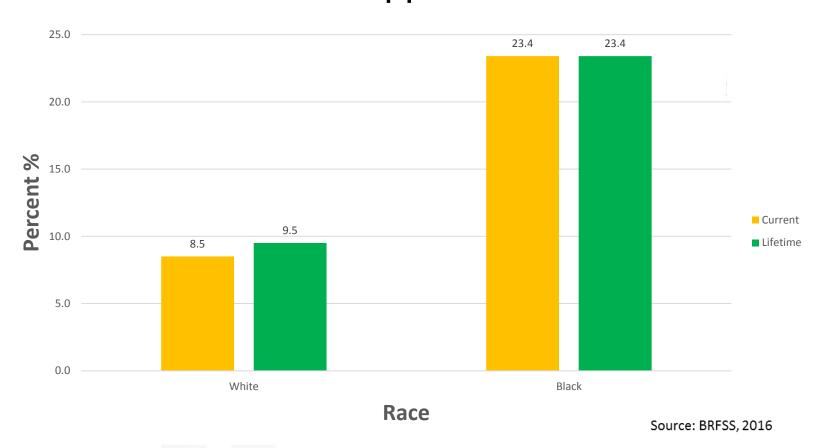
- In MS, more female adults than male adults with asthma cannot see a doctor because of cost. In 2017, 18.8% of female adults with lifetime and current asthma reportedly could not see a doctor because of cost, compared to 12.7% of male adults.
- In MS, black adults have a higher percentage than white adults with asthma who cannot see a doctor because of cost. In 2017, 23.4% of blacks with asthma reportedly could not see a doctor because of cost, compared to an average of 9.0% of white adults.



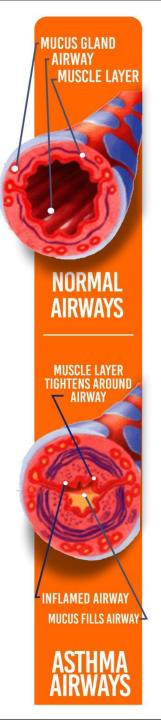
Proportion of Adult Asthma Cost, Mississippi: 2017

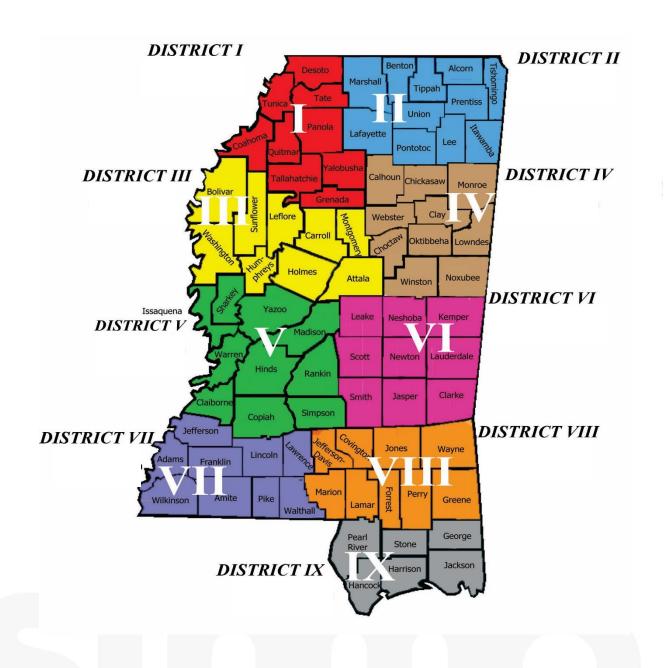


Proportion of Adult Asthma Cost, Mississippi: 2017



Asthma Hospitalizations





Proportion of Hospital Asthma Visits by District, Mississippi: 2016

